

Variations in Implementation of Quality Interventions (VIQI): Examining the Quality-Child Outcomes Relationship in Child Care and Early Education

The Variations in Implementation of Quality Interventions (VIQI): Examining the Quality-Child Outcomes Relationship in Child Care and Early Education project is a large-scale, rigorous study sponsored by the Office of Planning, Research, and Evaluation (OPRE) in the Administration for Children and Families, U.S. Department of Health and Human Services.

Project Goals

Experts agree that the quality of children's early care and educational experiences is critical for promoting children's development. However, there is a lack of consensus around which aspects of quality matter most, what levels of quality are essential for promoting children's development, and how quality enhancement efforts should be designed in order to reliably promote children's developmental outcomes, particularly in light of the varied landscape of child care, Head Start, and early care and education nationally.

With the VIQI project, OPRE aims to address these issues and to build substantial new evidence to inform center-based child care and Head Start policies and practices by addressing the following research questions:

- Do overall improvements in classroom quality promote children's developmental outcomes?
- Do different dimensions of classroom quality yield different effects on children's developmental outcomes?
- Do critical levels in classroom quality need to be met in order to promote children's developmental outcomes?
- Do the effects of classroom quality different dimensions or levels on children's developmental outcomes differ, depending on child, staff, and center characteristics? Do differences in children's developmental outcomes vary based on the initial levels of classroom quality?
- Do classrooms with varying initial levels of *readiness to implement the intervention* benefit from quality improvement efforts differently? Do classrooms with varying initial levels of *classroom quality* benefit from quality improvement efforts differently?

Study Design

The VIQI project is a multi-year project that started in 2016 and is being conducted in two key stages as shown in Exhibit 1. The first stage includes a pilot feasibility study to refine protocols and measures to inform the second stage, a larger-scale impact and implementation study.

The VIQI project draws upon a theoretical framework (see Exhibit 2) that delineates: (1) factors that may drive implementation and the impacts of the interventions, (2) different dimensions of quality, and (3) how they link with children's developmental outcomes. The dimensions of quality outlined are: (1) structural quality—structural or physical aspects of how early care and education classrooms are set up (e.g., availability of materials, arrangement of furniture); (2) interactional quality—the extent to which the classroom climate is positive, responsive, and predictable; and (3) instructional quality—a combination of (a) what is being taught (e.g., skill domains, content) with (b) how that information is being taught, including what instructional moves teachers use (e.g., asking open-ended questions, engaging in sustained discussions) and what activity settings are used (e.g., whole group, small group).

At the core of the project is a 3-group randomized controlled study (i.e., two intervention groups, one comparison group) testing two theoretically distinct interventions consisting of curricular and professional development supports that target different dimensions of classroom quality. One intervention consists of a whole-child, global approach curriculum that is hypothesized to promote structural and interactional quality. The other intervention consists of an integrated, domain-specific curriculum that follows a scope and sequence and is hypothesized to promote instructional quality. Both intervention groups receive intervention-specific professional development. The comparison group continues implementing "business-as-usual" practices. Indepth information on curriculum implementation, classroom quality, and child outcomes is collected (1) to understand the conditions that shape the fidelity of implementation of the interventions, (2) to test the effects of the interventions, and (3) to examine how different levels and dimensions of classroom quality causally relate with children's developmental outcomes. Taken together, VIQI examines how these interventions improve a range of children's developmental outcomes in mixed-aged classrooms serving 3- and 4-year-olds in community-based child care and Head Start settings that vary in initial levels of quality.

Partners

VIQI is being conducted by MDRC and its partners: Margaret Burchinal at the University of Virginia, MEF Associates, Abt Associates/Abt SRBI, and RTI International. For more information, please contact the principal investigator, JoAnn Hsueh at joann.hsueh@mdrc.org, or the project officers, Ivelisse Martinez-Beck at jvelisse.martinezbeck@acf.hhs.gov and Amy Madigan at amy.madigan@acf.hhs.gov.

Exhibit 1. Timeline for the VIQI Project

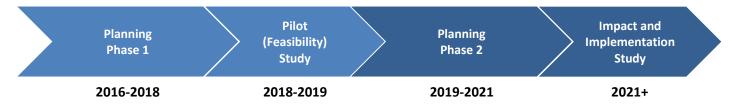
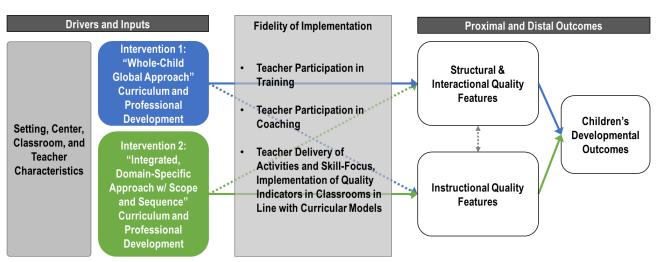


Exhibit 2. Theoretical Framework Underlying the VIQI Project



Step 1. 3-group random assignment design and install interventions...

Step 2. Measure implementation drivers and inputs and fidelity of implementation...

Step 3. Assess quality in all classrooms...

Step 4. Assess child outcomes in all classrooms...